WHAT IS CLAIMED IS:

1. A method of identifying the location of premalignant or malignant breast cancer within a breast duct or breast ductal network, said method comprising:

providing a targeting molecule coupled to an identifying agent; and

delivering the coupled compound through a preselected individual breast duct in an amount sufficient to identify premalignant or malignant cancerous cells.

2. A method as in claim 1, wherein delivering comprises cannulation or catheterization of the breast duct.

3. A method as in claim 1, wherein the coupled compound is delivered to more than one duct on a breast.

4. A method as in claim 1, wherein the cells are identified for the purpose of excising tissue surrounding and including the cells.

5. A method of identifying the location of premalignant or malignant breast cancer within a breast duct or breast ductal network, said method comprising:

providing a identifying agent; and

delivering the identifying agent through a preselected individual breast duct in an amount sufficient to identify premalignant or malignant cancerous cells.

6. A method as in claim 5, wherein delivering comprises cannulation or catheterization of the breast duct.

7. A method as in claim 5, wherein the identifying agent is delivered to more than one duct on a breast.

8. A method as in claim 5, wherein the cells are identified for the purpose of excising tissue surrounding and including the cells.

9. A method of determining the lymph node involvement in patients diagnosed with premalignant or malignant breast cancer growths, said method comprising:

providing an identifying agent coupled to a targeting agent; and

delivering the coupled compound through a preselected individual breast duct in an amount sufficient to detect lymph node involvement.

10. A method as in claim 9, wherein detecting lymph node involvement comprises detecting the identifying agent coupled to a targeting agent in a sentinel lymph node.

11. A method as in claim 9, wherein delivering comprises cannulation or catheterization of the breast duct.

12. A method as in claim 9, wherein the identifying agent coupled to a targeting agent is delivered to more than one duct on a breast.

13. A method of determining the lymph node involvement in patients diagnosed with premalignant or malignant breast cancer growths, said method comprising:

providing a identifying agent; and

delivering the identifying agent through a preselected individual breast duct in an amount sufficient to detect lymph node involvement.

14. A method as in claim 13, wherein detecting lymph node involvement comprises detecting the identifying agent in a sentinel lymph node.

15. A method as in claim 13, wherein delivering comprises cannulation or catheterization of the breast duct.

16. A method as in claim 13, wherein the identifying agent is delivered to more than one duct on a breast.

17. A method of treating premalignant or malignant breast cancer, said method comprising:

providing a targeting molecule coupled to a therapeutic agent; and

delivering the coupled compound through a preselected individual breast duct in an amount sufficient to inhibit proliferation of the cancerous cells.

18. A method as in claim 17, wherein delivering comprises cannulation or catheterization of the breast duct.

19. A method as in claim 17, wherein the coupled compound is delivered to more than one duct on a breast.

20. A method as in claim 17, wherein the targeting agent comprises an agent selected from the group consisting of a protein, a polypeptide, a peptide, an antibody, an antibody fragment, a ligand, a receptor, a drug, a chemical, a lipid, a liposome, a small molecule, and a nucleic acid.

21. A method as in claim 17, wherein the therapeutic agent is selected from the group consisting of a cytotoxic agent, a cytolytic agent, a growth inhibiting agent, an antagonist, an agonist, and a drug or agent containing liposome.

22. A method as in claim 17, wherein the therapeutic agent comprises an agent with therapeutic activity against cancerous or precancerous cells that can be coupled to a targeting agent.

23. A method of treating a premalignant or malignant breast cancer, said method comprising:

providing a targeting molecule itself having therapeutic activity; and

delivering the targeting molecule through a preselected individual breast duct in an amount sufficient to inhibit proliferation of the cancerous cells.

24. A method as in claim 23, wherein delivering comprises cannulation or catheterization of the breast duct.

25. A method as in claim 23, wherein the targeting molecule is delivered to more than one duct on a breast.

26. A method as in claim 23, wherein the targeting molecule comprises an agent selected from the group consisting of a protein, a polypeptide, a peptide, an antibody, an antibody fragment, a ligand, a receptor, a drug, a chemical, a lipid, a liposome, a small molecule, and a nucleic acid.

27. A method as in claim 23, wherein the therapeutic activity is selected from the group consisting of a cytotoxicity, a cytolytic activity, growth inhibition, antagonism, an agonism, and immunotoxicity.

28. A method as in claim 23, wherein the therapeutic activity is effective against cancerous or precancerous cells.

29. A method as in claim 17 or 23, wherein the premalignant or malignant breast cancer comprises cells having a stage selected from the group consisting of hyperplasia, atypical hyperplasia, low-grade ductal carcinoma *in situ*, high-grade ductal carcinoma *in situ*, and invasive carcinoma.

30. A kit for localizing or treating lesions in a breast duct, said kits comprising:

at least one catheter configured to access a ductal network in a human breast; and

instructions for use setting forth a method according to any of claims 1 to 28.

31. A kit as in claim 30, further comprising at least one container holding a reagent which is used in the method being performed with the kit.

32. A kit as in claim 30, further comprising a package holding the catheter and the instructions for use.